

**TDMS No.** 99023 - 01

**P18: INCIDENCE RATES OF NON-NEOPLASTIC LESIONS BY ANATOMIC SITE (a) WITH  
AVERAGE SEVERITY GRADES[b]**

**Date Report Requested:** 06/08/2009

**Test Type:** 90-DAY

beta-Myrcene

**Time Report Requested:** 12:50:40

**Route:** GAVAGE

**CAS Number:** 123-35-3

**First Dose M/F:** 01/29/01 / 01/30/01

**Species/Strain:** RATS/F 344/N

**Lab:** BAT

F2\_R2

**C Number:** C99023

**Lock Date:** 10/17/2001

**Cage Range:** ALL

**Date Range:** ALL

**Reasons For Removal:** ALL

**Removal Date Range:** ALL

**Treatment Groups:** Include ALL

**Study Gender:** Both

**TDMSE Version:** 2.1.0

Test Type: 90-DAY

beta-Myrcene

Time Report Requested: 12:50:40

Route: GAVAGE

CAS Number: 123-35-3

First Dose M/F: 01/29/01 / 01/30/01

Species/Strain: RATS/F 344/N

Lab: BAT

FISCHER 344 RATS MALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
<b>Disposition Summary</b>						
Animals Initially in Study	10	10	10	10	10	10
Early Deaths						
Dosing Accident			1	1		
Moribund Sacrifice						2
Natural Death					2	8
Survivors						
Terminal Sacrifice	10	10	9	9	8	
Animals Examined Microscopically	10	10	10	10	10	10
<b>ALIMENTARY SYSTEM</b>						
Esophagus	(10)	(0)	(1)	(1)	(10)	(10)
Perforation			1 [4.0]			
Intestine Small, Jejunum	(10)	(0)	(1)	(1)	(10)	(10)
Atrophy					2 [2.0]	
Liver	(10)	(0)	(2)	(1)	(10)	(10)
Fibrosis, Focal					1 [1.0]	
Hepatodiaphragmatic Nodule	1		1			
Inflammation, Chronic					1 [1.0]	
Oral Mucosa	(0)	(0)	(0)	(0)	(2)	(0)
Inflammation, Chronic					1 [2.0]	
Pancreas	(10)	(0)	(1)	(1)	(10)	(10)
Acinus, Atrophy	1 [1.0]				1 [1.0]	
Stomach, Forestomach	(10)	(0)	(1)	(10)	(10)	(10)
Inflammation, Acute					1 [1.0]	9 [2.3]
Ulcer						5 [2.4]
<b>CARDIOVASCULAR SYSTEM</b>						
Heart	(10)	(0)	(1)	(1)	(10)	(10)
Inflammation, Chronic Active	5 [1.0]					
<b>ENDOCRINE SYSTEM</b>						
Adrenal Cortex	(10)	(0)	(1)	(1)	(10)	(10)

a - Number of animals examined microscopically at site and number of animals with lesion

b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)

Test Type: 90-DAY

beta-Myrcene

Time Report Requested: 12:50:40

Route: GAVAGE

CAS Number: 123-35-3

First Dose M/F: 01/29/01 / 01/30/01

Species/Strain: RATS/F 344/N

Lab: BAT

FISCHER 344 RATS MALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
Hemorrhage Hyperplasia, Focal	2 [1.0]				1 [2.0]	
GENERAL BODY SYSTEM						
None						
GENITAL SYSTEM						
Epididymis	(10)	(0)	(1)	(1)	(10)	(10)
Degeneration					1 [4.0]	
Preputial Gland	(10)	(0)	(1)	(1)	(10)	(10)
Inflammation, Suppurative						1 [4.0]
Seminal Vesicle	(10)	(0)	(1)	(1)	(10)	(9)
Atrophy					1 [4.0]	
Testes	(10)	(0)	(1)	(1)	(10)	(10)
Germinal Epithelium, Degeneration					1 [2.0]	
HEMATOPOIETIC SYSTEM						
Lymph Node	(1)	(2)	(4)	(1)	(0)	(0)
Deep Cervical, Ectasia	1 [2.0]	2 [3.0]	4 [1.5]	1 [2.0]		
Deep Cervical, Hyperplasia, Lymphoid	1 [3.0]	2 [2.0]	4 [2.8]	1 [3.0]		
Lymph Node, Mesenteric	(10)	(0)	(1)	(1)	(10)	(10)
Atrophy				1 [1.0]	6 [1.7]	
Spleen	(10)	(10)	(10)	(10)	(10)	(10)
Atrophy			1 [2.0]		10 [1.8]	10 [4.0]
Thymus	(10)	(0)	(1)	(10)	(9)	(10)
Atrophy						1 [3.0]
Necrosis					1 [3.0]	9 [3.8]
INTEGUMENTARY SYSTEM						
None						
MUSCULOSKELETAL SYSTEM						

a - Number of animals examined microscopically at site and number of animals with lesion

b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)

Test Type: 90-DAY

beta-Myrcene

Time Report Requested: 12:50:40

Route: GAVAGE

CAS Number: 123-35-3

First Dose M/F: 01/29/01 / 01/30/01

Species/Strain: RATS/F 344/N

Lab: BAT

FISCHER 344 RATS MALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
None						
NERVOUS SYSTEM						
None						
RESPIRATORY SYSTEM						
Lung	(10)	(0)	(1)	(1)	(10)	(10)
Congestion				1 [2.0]		
Inflammation, Suppurative					1 [3.0]	
Inflammation, Chronic	5 [1.0]				3 [1.3]	
Metaplasia, Osseous	1 [1.0]					
Bronchus, Infiltration Cellular, Polymorphonuclear					1 [2.0]	
Nose	(10)	(10)	(10)	(10)	(10)	(10)
Inflammation, Suppurative				1 [1.0]	3 [1.0]	7 [2.0]
Inflammation, Chronic			1 [1.0]	6 [1.0]	8 [1.1]	
Metaplasia, Squamous						2 [1.5]
Olfactory Epithelium, Degeneration				2 [1.0]	8 [2.6]	9 [3.6]
Respiratory Epithelium, Necrosis						9 [3.6]
SPECIAL SENSES SYSTEM						
Eye	(10)	(0)	(1)	(1)	(10)	(10)
Anterior Chamber, Cornea, Inflammation, Suppurative					1 [3.0]	
Harderian Gland	(10)	(10)	(10)	(10)	(9)	(10)
Pigmentation, Porphyrin	1 [1.0]	3 [1.0]	7 [1.0]	8 [1.1]	9 [1.3]	10 [3.7]
URINARY SYSTEM						
Kidney	(7)	(10)	(9)	(10)	(10)	(10)
Nephropathy	7 [1.0]	10 [1.0]	9 [1.3]	8 [1.0]	9 [1.9]	1 [1.0]
Nephrosis			1 [1.0]	10 [1.0]	9 [2.7]	
Renal Tubule, Accumulation, Hyaline Droplet		10 [2.0]	9 [2.4]	10 [2.1]		
Renal Tubule, Degeneration		10 [1.0]	9 [1.1]			

a - Number of animals examined microscopically at site and number of animals with lesion

b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)

FISCHER 344 RATS MALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
Renal Tubule, Necrosis					1 [4.0]	1 [2.0]

\*\*\* END OF MALE \*\*\*

a - Number of animals examined microscopically at site and number of animals with lesion  
b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)

Test Type: 90-DAY

beta-Myrcene

Time Report Requested: 12:50:40

Route: GAVAGE

CAS Number: 123-35-3

First Dose M/F: 01/29/01 / 01/30/01

Species/Strain: RATS/F 344/N

Lab: BAT

FISCHER 344 RATS FEMALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
<b>Disposition Summary</b>						
Animals Initially in Study	10	10	10	10	10	10
Early Deaths						
Dosing Accident				1		1
Moribund Sacrifice					2	1
Natural Death					2	8
Survivors						
Terminal Sacrifice	10	10	10	9	6	
Animals Examined Microscopically	10	10	10	10	10	10
<b>ALIMENTARY SYSTEM</b>						
Intestine Small, Ileum	(10)	(0)	(0)	(1)	(10)	(10)
Atrophy					1 [3.0]	
Intestine Small, Jejunum	(10)	(0)	(0)	(1)	(10)	(10)
Atrophy					1 [3.0]	
Liver	(10)	(1)	(1)	(2)	(10)	(10)
Fibrosis, Focal				1 [1.0]		
Hepatodiaphragmatic Nodule		1	1	1	1	
Inflammation, Chronic	1 [1.0]			1 [1.0]		
Bile Duct, Hyperplasia					1 [1.0]	
Mesentery	(0)	(1)	(0)	(0)	(0)	(0)
Fat, Necrosis		1 [2.0]				
Pancreas	(10)	(0)	(0)	(1)	(10)	(10)
Acinus, Atrophy, Focal	1 [1.0]					
Stomach, Forestomach	(10)	(0)	(0)	(10)	(10)	(10)
Inflammation, Acute					4 [1.8]	10 [2.8]
Ulcer					2 [2.5]	3 [2.3]
<b>CARDIOVASCULAR SYSTEM</b>						
Heart	(10)	(0)	(0)	(1)	(10)	(10)
Inflammation, Chronic Active	1 [1.0]					
<b>ENDOCRINE SYSTEM</b>						

a - Number of animals examined microscopically at site and number of animals with lesion

b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)

Test Type: 90-DAY

beta-Myrcene

Time Report Requested: 12:50:40

Route: GAVAGE

CAS Number: 123-35-3

First Dose M/F: 01/29/01 / 01/30/01

Species/Strain: RATS/F 344/N

Lab: BAT

FISCHER 344 RATS FEMALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
None						
GENERAL BODY SYSTEM						
None						
GENITAL SYSTEM						
Uterus	(10)	(0)	(0)	(1)	(10)	(10)
Endometrium, Hyperplasia, Cystic	1 [1.0]				1 [1.0]	
HEMATOPOIETIC SYSTEM						
Lymph Node	(1)	(3)	(5)	(1)	(1)	(0)
Deep Cervical, Ectasia	1 [3.0]	3 [2.0]	4 [1.5]		1 [1.0]	
Deep Cervical, Hyperplasia, Lymphoid	1 [3.0]	3 [1.7]	5 [2.4]	1 [3.0]	1 [3.0]	
Lymph Node, Mesenteric	(10)	(0)	(0)	(3)	(10)	(10)
Atrophy				2 [1.0]	4 [1.8]	
Spleen	(10)	(0)	(10)	(10)	(10)	(10)
Atrophy				1 [1.0]	10 [1.8]	10 [3.8]
Thymus	(10)	(0)	(1)	(10)	(10)	(10)
Atrophy					1 [3.0]	
Hemorrhage			1 [2.0]			
Necrosis					3 [1.3]	8 [2.6]
INTEGUMENTARY SYSTEM						
None						
MUSCULOSKELETAL SYSTEM						
None						
NERVOUS SYSTEM						
None						

a - Number of animals examined microscopically at site and number of animals with lesion

b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)

Test Type: 90-DAY

beta-Myrcene

Time Report Requested: 12:50:40

Route: GAVAGE

CAS Number: 123-35-3

First Dose M/F: 01/29/01 / 01/30/01

Species/Strain: RATS/F 344/N

Lab: BAT

FISCHER 344 RATS FEMALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
RESPIRATORY SYSTEM						
Lung	(10)	(0)	(0)	(1)	(10)	(10)
Inflammation, Chronic	4 [1.0]				4 [1.0]	
Metaplasia, Osseous	1 [1.0]				1 [1.0]	1 [1.0]
Alveolus, Necrosis, Acute						1 [4.0]
Vein, Thrombosis				1 [2.0]		
Nose	(10)	(0)	(10)	(10)	(10)	(10)
Inflammation, Suppurative				1 [1.0]	6 [1.7]	9 [1.8]
Inflammation, Chronic				9 [1.0]	4 [1.5]	
Olfactory Epithelium, Degeneration				2 [1.5]	7 [2.9]	10 [3.8]
Respiratory Epithelium, Necrosis				1 [1.0]	2 [2.5]	10 [3.8]
Trachea	(10)	(0)	(0)	(1)	(10)	(10)
Inflammation, Chronic					1 [2.0]	
SPECIAL SENSES SYSTEM						
Eye	(10)	(0)	(0)	(1)	(10)	(10)
Cataract					1 [3.0]	
Posterior Chamber, Exudate					1 [4.0]	
Retina, Atrophy					1 [2.0]	
Harderian Gland	(10)	(10)	(10)	(10)	(10)	(10)
Pigmentation, Porphyrin	3 [1.0]	4 [1.0]	2 [1.0]	4 [1.0]	5 [1.6]	10 [4.0]
Lacrimal Gland	(0)	(0)	(0)	(0)	(0)	(1)
Epithelium, Degeneration						1 [1.0]
URINARY SYSTEM						
Kidney	(10)	(10)	(10)	(10)	(10)	(10)
Atrophy						1 [4.0]
Nephropathy	1 [1.0]	2 [1.0]	3 [1.0]	4 [1.0]	1 [1.0]	
Nephrosis				10 [1.0]	7 [1.1]	
Renal Tubule, Degeneration		10 [1.0]	10 [1.0]			
Renal Tubule, Mineralization		2 [1.0]	1 [1.0]	1 [1.0]	1 [1.0]	1 [1.0]
Renal Tubule, Necrosis					2 [3.5]	2 [4.0]

a - Number of animals examined microscopically at site and number of animals with lesion

b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)



TDMS No. 99023 - 01

P18: INCIDENCE RATES OF NON-NEOPLASTIC LESIONS BY ANATOMIC SITE (a) WITH  
AVERAGE SEVERITY GRADES[b]

Date Report Requested: 06/08/2009

Test Type: 90-DAY

beta-Myrcene

Time Report Requested: 12:50:40

Route: GAVAGE

CAS Number: 123-35-3

First Dose M/F: 01/29/01 / 01/30/01

Species/Strain: RATS/F 344/N

Lab: BAT

FISCHER 344 RATS FEMALE	0 G/KG	0.25 G/KG	0.5 G/KG	1.0 G/KG	2.0 G/KG	4.0 G/KG
-------------------------	--------	-----------	----------	----------	----------	----------

\*\*\* END OF REPORT \*\*\*

a - Number of animals examined microscopically at site and number of animals with lesion  
b - Average severity grade (1-minimal; 2-mild; 3-moderate; 4-marked)